

**Subject:** Fw: Nutrient center conference call - 2nd meeting  
**To:** Bill Dunbar <dunbar.bill@epa.gov>  
**Cc:**  
**From:** CN=Thomas Eaton/OU=R10/O=USEPA/C=US  
**Submit Time:** 10/22/2012 16:47:38

Hi Bill,

Not sure what the referenced discussion of the "EPA Nutrient Center" is, but thought it might be the national center you have mentioned going by a different name.

Tom Eaton  
Director  
Washington Operations Office  
USEPA, Region 10  
360-753-8086

----- Forwarded by Thomas Eaton/R10/USEPA/US on 10/22/2012 09:46 AM -----

From: Washington State Dairy Federation -- <wsdf@msn.com>  
To: Joe Harrison <jhharrison@wsu.edu>, <meb@wsu.edu>, Shulen Chen <chens@wsu.edu>, Chad Kruger <cekruger@wsu.edu>, <chorr@wsu.edu>, <jcadam@wsu.edu>, <ckkeller@wsu.edu>, Craig Frear <cfrear@wsu.edu>, <troy\_peters@wsu.edu>, Nora Mena <nmena@agr.wa.gov>, <doug.pettinger@darigold.com>, Virginia Prest <vpres@agr.wa.gov>, <bradym@wsu.edu>, <zaheru@wsu.edu>, <stockle@wsu.edu>, <paul.whitney@wsu.edu>, <rdevans@wsu.edu>, <jwu@wsu.edu>, <john\_harrison@vancouver.wsu.edu>  
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Date: 10/20/2012 01:59 PM  
Subject: RE: Nutrient center conference call - 2nd meeting

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Mike et al,

For starters, please forgive me if I have any errors in the following discussion, I am a farmer among many just trying to figure this groundwater out.

The other aspect that Joe mentioned yesterday was that your initial concept was to look at only dairies. The Yakim GWMA is a county led collaborative process focused on reducing nitrates in Groundwater from all sources of significance...I suggested both that you should talk to Jason, Steve and Dan, but I also suggested that we are a bit sensitive right now since our folks are getting singled out by EPA among all the different current and historical sources of nitrate users...We are just one of the sources and our folks are the only ones who currently have to maintain nutrient management plans, keep soil, manure, fertilizer and soil tests and records and get inspected by the Wa. Dept of Ag and the EPA. Not one other source of nitrates in the basin or state has to do what dairyfarmers are already doing to be protective of both surface and groundwater quality. Dairy cannot improve groundwater alone, therefore any science effort needs to look at and for all sources.

That being said, there is a need to bring good quality science, especially a quality designed monitoring and evaluation process - up front, into the lower basin. science and evaluations with the open mind to look in a quality, detailed, systematic manner at all sources across the basin and over time (**past , current and future!!**).

Then as we and the GWMA gain quality information and Knowledge we can suggest or the GWMA can

require changes or additional changes be made on dairy farms, crop farms, feedlots, septic tanks, whatever the source, and then hopefully those changes in practices, based on good information, will make a difference that can be measured and actually result in better groundwater quality.

I understand that the Canadians in lower Frazier have established such a system and I suspect the Upper Columbia Basin GWMA has also long ago established a specific, well designed system / network of monitoring wells for identifying sources as well as tracking changes in water quality.

There currently is no such system in the Lower Yakima, all testing that I am aware of over the past 15 years, including the latest EPA "report" has been done using existing domestic, Ag and industrial wells. Problem with these wells is that generally they are limited to testing water from only one location, generally assume at the bottom of the well in one of either two or three aquifers (upper aquifer generally in the 50-90 foot range and the deeper aquifer is 180-280 foot range....I may be off on these numbers a bit)

...there are no wells THAT I KNOW OF, that have sample ports progressively down the soil gradient, so we have no progressive data. We end up with only data on water that is age dated between 15 and 45 years. It is impossible to gauge any changes in management if we have to wait 15-45 years...

Using only bottom of well data with old water means we end up with farmers indicted for historical nitrate contributions and inefficiencies from historical technology. (for instance, 10-15 years ago many Yakima farms converted to center pivots from flood and rill irrigation. Flood and rill was the standard irrigation practice for many years, it is still in many areas including some still in the Yakima, and it was considered a good practice, but it also was inefficient and from what I understand it results in using more acre feet of water per crop acre, inefficiently though, and therefore a higher leaching potential. Fertilizer also was significantly less expensive 10 -20 years ago and was used at higher rates, as a precaution and because of irrigation style...so even 20-25 year old water in the bottom of the shallow aquifer still reflects nitrate levels that may be symptomatic of the farming practices of the times.

We need a better, professionally designed, scientifically reliable network of test wells, not the Ad Hoc use of domestic, Ag and Industrial wells with limited knowledge about the depth, casings, perforation depth, with single egress porting/perforating.

Hope this helps.

I have CC'ed Steve George, Jason Sheehan and Dan DeGroot on this email if you would like to contact them and talk to them about what your thoughts are for WSU to assist in the Lower Yakima GWMA.

thanks for your interest.

*Jay Gordon*

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Date: Sat, 20 Oct 2012 18:24:14 +0000

Mike

I visited with Jay Gordon from the dairy federation yesterday and I shared that the group was gravitating toward a project in Yakima and dairy focused.

I think it fair to say that there would not be a willingness on the part of dairy producers to participate unless the nut ctr project was directly connected to the GWMA that is underway.

I am on my way to the agronomy meetings in Cincinnati.

Jay recommended that you make contact with Steve George, Jason Sheehan, and Dan DeGroot, all who serve on the GWMA.

Joe

Sent via BlackBerry by AT&T

**From:** "Barber, Michael Ernest" <meb@wsu.edu>

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**Subject:** Nutrient center conference call - 2nd meeting

Folks,

Please cast your vote for a continued discussion of the EPA Nutrient Center for times listed Thursday 10/25 or Friday 10/26.

<http://www.doodle.com/gnt4xehkeq688bd7>

Feel free to share this link with any others who should cast their votes. I will send meeting number and ID next week once we've selected a time.

Thanks,

Mike

[illegible]

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